



IMC KALIUM CARLSBAD, INC., POTASH ASSOCIATION OF NEW MEXICO;  
YATES PETROLEUM CORPORATION; POGO PRODUCING COMPANY;  
BUREAU OF LAND MANAGEMENT

170 IBLA 25

Decided September 7, 2006

**Editor's note:** Appeal filed sub nom. Potash Association of New Mexico v. DOI,  
Civ. No. 1:06-CV-01190-MCA-ACT (D. N.M. Dec. 6, 2006), **dismissed without**  
**prejudice as premature** (Aug. 29, 2008)



United States Department of the Interior  
Office of Hearings and Appeals  
Interior Board of Land Appeals  
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POTASH ASSOCIATION OF NEW MEXICO;  
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IBLA 2003-334, 2003-335,  
2003-336, and 2003-341

Decided September 7, 2006

Appeals from an order issued by Administrative Law Judge Patricia McDonald, remanding the denial of 72 applications for permits to drill oil and gas wells in the designated Potash Area to the New Mexico State Director, Bureau of Land Management.

Decision affirmed.

1. Administrative Authority: Generally--Administrative Procedure: Decisions--Appeals: Jurisdiction

A standard for identifying leasable minerals and classifying public lands for possible disposal, that was later used by BLM to identify potash enclaves under a subsequently issued secretarial order is subject to challenge and review by the Interior Board of Land Appeals to determine whether BLM properly identified and periodically revised such enclaves based upon its consideration of “existing technology and economics,” under and as required by the then applicable Secretarial Order, 51 FR 39425 (Oct. 28, 1986).

2. Administrative Procedure: Decisions--State Laws

Since a potash enclave under the Secretarial Order must be identified based on potash ore that is mineable under existing economics and “known to exist,” whereas a “life-

of-the-mine reserve” (LMR) under state law does not consider economics and is based only on the “reasonable belief” of a potash lessee, BLM abrogates its duties under the Secretarial Order to consider economics and resources known to exist by relying exclusively upon LMR determinations to identify a potash enclave.

3. Administrative Procedure: Decisions

Since BLM must identify and periodically revise a potash enclave based on currently available data in consideration of “existing technology and economics,” it must review and periodically evaluate current technology and economics in order to identify potash enclaves properly and in the manner prescribed by the Secretarial Order.

4. Administrative Procedure: Administrative Law Judges--  
Administrative Procedure: Administrative Review--  
Evidence: Weight

Where a party disagrees with the weight given to the evidence but has not demonstrated that the Administrative Law Judge misunderstood the factual issues presented or otherwise committed a clear error in evaluating the evidence, the Board will not substitute its judgment on weighing the evidence for that of the Administrative Law Judge.

5. Administrative Procedure: Decisions--Administrative  
Procedure: Administrative Review--Mineral Leasing Act:  
Royalties--Potassium Leases and Permits: Royalties

The Secretarial Order requires that potash enclaves be identified based on existing economics, but since the record fails to demonstrate how (if at all) royalties and royalty rate reductions were considered by BLM in identifying potash enclaves, BLM must determine on remand whether and, if so, how best to consider royalties and royalty reductions in its enclave decisionmaking under the Secretarial Order.

6. Administrative Procedure: Hearings--Administrative Procedure: Administrative Law Judges--Rules of Practice: Evidence

Where the testimony of an expert is excluded and an offer of proof under 43 CFR 4.435 shows that no new facts would have been presented and that the matters on which the expert would have testified were thoroughly raised by others, the affected party has failed to establish prejudice or that the Administrative Law Judge otherwise abused her discretion in excluding this expert's testimony.

7. Administrative Procedure: Decisions--Oil and Gas Leases: Drilling

When establishing and locating a drilling island ("consistent with present directional drilling capabilities") under the Secretarial Order's enclave policy, BLM must consider whether reasonably available direction drilling technologies and techniques can reach the intended target, but it need not consider drilling economics or the economic feasibility of directionally drilling a particular well from a specific location in the Potash Area.

8. Administrative Procedure: Decision--Administrative Procedure: Administrative Review--Applications for Permits to Drill--Oil and Gas Leases: Drilling--Oil and Gas Leases: Stipulations

Applications for permits to drill may be denied pursuant to the oil and gas lease stipulations of the Secretarial Order if BLM determines that contamination from oil and gas drilling will occur, that such contamination cannot be prevented, and that this contamination will interfere with potash mining, result in undue potash waste, or constitute a hazard to potash mining.

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New Mexico, for Pogo Producing Company; and Grant L. Vaughn, Esq., Office of the Regional Solicitor, Albuquerque, New Mexico, for the Bureau of Land Management.

OPINION BY ADMINISTRATIVE JUDGE JACKSON

After an 80-day hearing during which 37 witnesses testified and 1,200 exhibits were accepted into evidence, Administrative Law Judge Patricia McDonald issued a 247-page Order (ALJ Decision) in a matter that was earlier referred to the Hearings Division by the Board of Land Appeals. Yates Petroleum Corp., 131 IBLA 230 (1994). The following parties participated in the hearing and are appealing her order: IMC Kalium Carlsbad, Inc. (IMC) <sup>1/</sup> and Potash Association of New Mexico (Potash Association), IBLA 2003-334; Yates Petroleum Corporation (Yates), IBLA 2003-335; Pogo Producing Company (Pogo), IBLA 2003-336; and the Bureau of Land Management (BLM), IBLA 2003-341. <sup>2/</sup> IMC is a major potash lessee that could be adversely affected by oil and gas drilling in the Potash Area of southeastern New Mexico. <sup>3/</sup> Yates and Pogo are oil and gas lessees that seek to drill wells in the Potash Area.

Order on Appeal - ALJ Decision

At issue are 72 applications for permits to drill (APDs) oil and gas wells in Eddy and Lea Counties, New Mexico. BLM, denied these APDs Between January 1992 and October 1994, under and in consideration of an order signed by Secretary Hodel and published in the Federal Register (Secretarial Order). 51 FR 39425 (Oct. 28, 1986), corrected 52 FR 32171 (Aug. 26, 1987). These denials were initially appealed by Yates and Pogo in Yates Petroleum Corp. (Yates), supra.

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<sup>1/</sup> Counsel for IMC represents that IMC is now known as Mosaic Potash Carlsbad, Inc., but continues to identify this appellant as IMC in its filings with the Board. We will continue to do likewise.

<sup>2/</sup> Collective references to IMC and the Potash Association will be as “IMC/Potash”; collective references to Yates and Pogo will be as “Yates/Pogo.”

<sup>3/</sup> Potash refers to various potassium compounds. Sylvite (potassium chloride) is the most common and is used for fertilizer, in drilling and fracturing fluids, and as a feedstock for other potassium chemicals. Langbeinite (potassium magnesium sulfate) is more valuable, relatively rare, and found domestically only in the Potash Area (ALJ Decision at 16), a region that encompasses nearly 500,000 acres in southeastern New Mexico and includes the proposed drilling locations in Eddy and Lea Counties. 51 FR 39425, 39426-39427 (Oct. 28, 1986).

The Secretarial Order establishes parameters for concurrent oil, gas, and potash operations within the Potash Area <sup>4/</sup> and includes an enclave policy: “It is the policy of the Department of the Interior to deny approval of most applications for permits to drill oil and gas test wells from surface locations within the potash enclaves established in accordance with Part D, item 1 of this Order.” 51 FR at 39425 (Section III, Part E, Item 1). As to potash enclaves (i.e., areas “where potash ore is known to exist in sufficient thickness and quality to be mineable under existing technology and economics”), the Secretarial Order requires potash lessees annually to submit maps delineating their active operations, completed operations, mineable reserves, and areas barren of commercial ore, and directs BLM to review this information and to identify potash enclaves “consistent with the data available at the time of such analysis” and periodically revise them “as necessary to reflect the latest available information.” Id.

We outlined the key requirements of the Secretarial Order in Yates, and held that

the 1986 Order does not grant BLM unfettered discretion to deny APDs in the Potash Area; rather, that discretion must be exercised within the parameters established by that Order. For example, BLM’s authority to deny APDs within a potash enclave pursuant to the policy announced in the 1986 Order is predicated on the area’s proper designation as an enclave in accordance with the requirements of the Order. Thus, if an area has not been correctly identified as a potash enclave, BLM cannot base its denial of an APD for a well in that area on the policy established in section III.E.1. of the 1986 Order.

131 IBLA at 235. We there granted Yates/Pogo’s request for a hearing and directed as follows:

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<sup>4/</sup> Concurrent resource development in the Potash Area has been an issue for over 50 years under a series of Secretarial Orders: a 1951 Secretarial Order first identified the Potash Area (nearly 300,000 acres) and mandated that certain stipulations appear in potash leases and oil and gas leases, 16 FR 10669 (Oct. 18, 1951); a 1965 Secretarial Order expanded the Potash Area by over 120,000 acres and retained lease stipulation requirements, 30 FR 6692 (May 15, 1965); a 1975 Secretarial Order increased the Potash Area by more than 70,000 acres, established an enclave policy and prescribed a procedure for BLM to identify and periodically revise potash enclaves, 40 FR 51489 (Nov. 5, 1975); and the 1986 Secretarial Order increased the Potash Area by approximately 5,000 acres and reiterated the enclave policy and other provisions of the earlier Secretarial Orders, 51 FR 39425 (Oct. 28, 1986).

[t]he primary focus of the hearing will be on whether BLM's denial of the APDs accords with the provisions of the 1986 Order. Resolution of that question hinges on numerous subsidiary determinations. Principal among those ancillary issues are whether the APDs encompass lands within areas qualifying as potash enclaves under the parameters established by section III.D.1.c. of the Order, i.e., whether the lands are currently unmined areas within Federal potash leases "where potash ore is known to exist in sufficient thickness and quality to be mineable under existing technology and economics," and whether approving the APDs would result in undue waste of potash deposits or constitute a hazard to or unduly interfere with mining operations being conducted for the extraction of potash deposits. Should the evidence show that the denied APDs seek to drill wells within properly established enclaves, the applicability of the two exceptions to the 1986 Order's stated policy of denying approval of APDs within such enclaves should also be explored.

131 IBLA at 235-36 (footnotes omitted). <sup>5/</sup> Each of the above-identified issues, as well as a host of other matters that arose during the hearing, were comprehensively addressed by Judge McDonald in the order now before us on review.

Judge McDonald first dispensed with arguments to limit the scope and substance of her review (ALJ Decision at 43-48), rejected claims that there is an absolute equality between potash and oil and gas activities in the Potash Area and that the first to develop a resource has preferential rights over others under the Secretarial Order, id. at 52-65, and held that the enclave policy applied to all oil and gas drilling on public lands in the Potash Area (regardless of such lands' leasing status and whether such drilling is for exploration or development). Id. at 70-103. Judge McDonald then scrutinized BLM's process for creating enclave maps, including

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<sup>5/</sup> The two referenced exceptions are for "barren areas" and "drilling islands" within a potash enclave. 51 FR at 29425-26 (Section III, Part E, Items 1.a and 1.b); see discussion infra.

its reliance upon the Van Sickle Standard for identifying potash enclaves. <sup>6/</sup> Id. at 103-30. She identified the principal issue to be decided as

whether the APDs encompass lands within areas qualifying as potash enclaves under the parameters established by section III.D.1.c of the Order, i.e., whether the lands are currently unmined areas within Federal potash leases “where potash ore is known to exist in sufficient thickness and quality to be mineable under existing technology and economics” \* \* \*.

Id. at 131, quoting Yates, 131 IBLA at 235.

Judge McDonald reviewed the history, origin, and use of potash enclaves under the Secretarial Order. (ALJ Decision at 137-42.) After noting that little testimony had been presented about the technology of potash mining (and even less on technology changes since the Van Sickle Standard was formulated in 1974), she concluded that the continuing validity of the Van Sickle Standard as the basis for identifying enclaves under the Secretarial Order “primarily concerns economics.” Id. at 179. She then considered and rejected Yates/Pogo’s argument that BLM’s broad grant of royalty relief to all potash lessees for all grades of potash ore conclusively demonstrated that no potash was economically recoverable under applicable royalty guidelines or “mineable under existing technology and economics” under the Secretarial Order. Id. at 181-85. In rejecting that argument, she determined that at least some potash would be mined without these royalty reductions. She also determined that some potash ore became economically recoverable as a result of these royalty reductions, noted that BLM had not identified what those ore grades are (i.e., cut-off grades), and observed that potash which is “not economically recoverable” under applicable royalty guidelines is not “mineable under existing technology and economics” under the Secretarial Order. Id. at 185.

Judge McDonald then proceeded to consider whether recent potash mining demonstrated the continuing validity of the Van Sickle Standard for identifying

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<sup>6/</sup> The standard used by BLM to identify potash enclaves under the Secretarial Order was first articulated by Donald M. Van Sickle, Area Geologist, United States Geological Survey (USGS), in 1974: “4 feet of 10% K<sub>2</sub>O as sylvite and 4 feet of 4% K<sub>2</sub>O as langbeinite, or an equivalent combination of the two.” (ALJ Decision at 67, 87.) This standard was based upon then applicable leasing criteria (i.e., a potash mineral classification standard) and consistently used thereafter to identify and map potash enclaves under the Secretarial Order. Id. at 104-14. The parties have consistently referred to this standard as the “Van Sickle Standard”; we will do likewise.

potash enclaves. IMC introduced evidence supporting this claim (e.g., expert testimony that its economic cut-off grades for potash approximated the Van Sickle Standard), but it was rebutted by other expert testimony. After thoroughly evaluating all the evidence presented, Judge McDonald concluded that the record failed to demonstrate that the 1974 Van Sickle Standard was still valid for identifying potash enclaves under the Secretarial Order. (ALJ Decision at 186-92.) Accordingly, she remanded all APDs that had been denied under the enclave policy to BLM for it to properly identify potash enclaves under the Secretarial Order consistent with her decision. Id. at 237-38.

Judge McDonald next considered “whether approving the APDs would result in undue waste of potash deposits or constitute a hazard to or unduly interfere with mining operations being conducted for the extraction of potash deposits,” as directed by this Board. (ALJ Decision at 15, quoting Yates, 131 IBLA at 235-36. <sup>7/</sup>) She analyzed the Secretarial Order’s oil and gas lease stipulations, determined that they were limited to addressing “whether drilling a well at the location identified in an APD will physically limit or preclude mining a potash deposit,” and then focused her consideration of waste, hazards, and interference on the following: whether oil or gas drilling technology and techniques would preclude substances from escaping the well bore (i.e., oil, gas, or water); whether any escaped substances would migrate to open potash mines; and whether subsidence due to potash mining would damage well casings, allowing substances to escape. Id. at 196-97. <sup>8/</sup> IMC/Potash maintained that possible contamination of potash deposits by oil, gas, or water is a sufficient basis upon which to deny APDs under the oil and gas lease stipulations of the Secretarial Order. Judge McDonald disagreed. Since these stipulations expressly require determinations on whether drilling “will \* \* \* interfere with the mining and recovery of potash deposits” and “would result in undue waste of potash deposits or constitute a hazard to or unduly interfere with mining operations,” 51 FR at 39425 (emphasis added), she held BLM findings of “likely” waste, “likely” interference, or “could prove hazardous” to be insufficient. Id. at 245; see also id. at 236 (“Finding a ‘potential’ to make mining unsafe to be a sufficient basis to deny approval of an APD would have the effect of prohibiting oil and gas drilling within most or all of the Potash Area, possibly allowing wells to be drilled only on its periphery or in large barren areas”).

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<sup>7/</sup> Our direction was based on the Secretarial Order’s oil and gas lease stipulations. 51 FR at 39425 (Section III, Part A).

<sup>8/</sup> The evidence on these issues covered drilling standards and procedures, as well as equipment, porosity, permeability, fluid flow, and geological features. (ALJ Decision at 197-233.)

Judge McDonald concluded her order by remanding virtually all of the denied APDs <sup>2/</sup> to BLM for further review consistent with her decision. Most were remanded because the record failed to establish that they were located in properly identified potash enclaves; others were remanded because they were denied based on possible risk (not that oil and gas drilling “would result” in potash waste, interference with, or a hazard to potash mining, as specified in the Secretarial Order (ALJ Decision at 235-47)); and some were remanded because BLM failed to create appropriately limited drilling islands in lieu of denying these APDs. Id. at 238-42.

### Issues Identified on Appeal

IMC/Potash assert in their current appeals that: A) BLM’s use of the Van Sickle Standard for identifying potash enclaves reflects Departmental policy and is not subject to our review; B) the Van Sickle Standard continues adequately to identify potash mineralization which is “mineable under existing technology and economics”; C) BLM can rely on “life-of-the-mine reserves” under state law to identify potash enclaves under the Secretarial Order; D) information that was offered at the hearing to support BLM’s denial of these APDs should have been considered by Judge McDonald; E) BLM’s long-standing use of the Van Sickle Standard to identify enclaves was supported by the record and should be affirmed; and F) oil and gas stipulations under the Secretarial Order address more than just whether an oil and gas well will physically limit potash mining. (IMC/Potash Statement of Reasons (SOR) at 3-4.)

Yates/Pogo contend that Judge McDonald erred in failing to hold that when granting royalty reductions for all grades of potash, BLM necessarily determined that no potash mining was economically recoverable and, therefore, no potash enclaves could be identified under the Secretarial Order as a matter of law. (Yates SOR at 1 and Pogo SOR at 7-21.) Yates asserts that BLM was under an affirmative duty to establish drilling islands and separately claims that Judge McDonald erroneously indicated that drilling islands cannot be established unless wells will be directionally drilled. (Yates SOR at 9-15.) Pogo separately asserts that Judge McDonald erred by failing to: admit the testimony of its expert witness; interpret the enclave policy’s reference to test wells as applying to exploratory wells only; and prohibit potash mining that could constitute a hazard to or interfere with oil and gas activities in the Potash Area. (Pogo SOR at 21-101.)

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<sup>2/</sup> The denial of an APD for Wolf No. 9 in 1992 was not timely appealed. (ALJ Decision at 244.) Judge McDonald determined that APDs for Mobil Federal No. 5 and for Mobil Federal 29 Nos. 2, 3, 6, and 7 had been constructively withdrawn by Pogo’s subsequent submission of APDs for the same locations, id. at 247; Pogo does not challenge that determination on appeal.

The final appellant, BLM, generally agrees with Judge McDonald's interpretation of the Secretarial Order. (BLM SOR at 1 ("The McDonald Order generally accords with the interpretations and decisions of the BLM under the Secretary's Potash Order").) BLM disputes only two aspects of her order: Judge McDonald's finding that the record did not support BLM's continued use of the Van Sickle Standard to identify potash enclaves, id. at 2-8, and her observation that potash ore which was "not economically recoverable" under applicable royalty guidelines is not "mineable under existing technology and economics" under the Secretarial Order. Id. at 8-12.

### Discussion of Issues Presented

The central issue considered at the hearing was whether BLM had properly identified potash enclaves under the Secretarial Order. Related issues were also raised as to whether BLM properly interpreted and applied that order in denying the APDs now on appeal. The parties' claimed errors fall under several topics: enclave standard, royalty rate reductions, excluded testimony, test wells, drilling islands, and lease stipulations. For ease of analysis, each topic will be discussed separately below.

#### *Enclave Standard:*

Since the Secretarial Order establishes an enclave policy requiring BLM to "deny approval of most applications for permit to drill oil and gas test wells from surface locations within the potash enclaves," 51 FR at 39425 (Section III, Part E, Item 1), the identification of potash enclaves is central to BLM's proper administration of the Potash Area under the Secretarial Order. The order defines enclaves as "\* \* \* those areas (enclaves) where potash ore is known to exist in sufficient thickness and quality to be mineable under existing technology and economics," 51 FR at 39425 (Section III, Part D, Item 1.c), and outlines a process for BLM to follow in periodically identifying and revising potash enclaves "consistent with the data available at the time of such analyses." 51 FR at 39425 (Section III, Part D).

It is uncontroverted that BLM used the Van Sickle Standard to identify potash enclaves and that this standard was based largely upon a 1969 potash mineral classification standard (i.e., "4 feet of 10% K<sub>2</sub>O as sylvite and 4 feet of 4% K<sub>2</sub>O as langbeinite, or an equivalent combination of the two"), as supplemented by core hole and other data for identifying where potash ore is known to exist. BLM and IMC/Potash argue that BLM's use of the Van Sickle Standard cannot be reviewed in this forum. BLM suggests that any review of the Van Sickle Standard constitutes an improper challenge to its mineral classification standard. (BLM SOR at 3.) IMC/Potash contend that the Van Sickle Standard is not reviewable by this Board

because it “had been approved at the highest levels of both USGS and the Department of the Interior.” (IMC/Potash SOR at 8.) We disagree.

A mineral classification standard is a tool used by BLM to identify recoverable minerals for possible leasing and to classify lands for possible disposal. (Yates/Pogo Ex. 254.) The record indicates that the 1969 potash mineral classification standard revised an earlier standard so as to reflect “technological advances in the potash industry made since 1957” and was “based on current and projected economic conditions.” Id. (Mar. 24, 1970, recommendation of the Chief, Conservation Division, USGS, to approve a revised potash mineral classification standard). In using the 1969 mineral classification standard to establish guidelines and identify potash enclaves in 1975, we assume Van Sickle considered potash mining technology and economics as they then existed. The issue is not whether the 1969 mineral classification standard is right, wrong, or can continue to be used by BLM for other purposes, nor is it whether the Van Sickle Standard could have been used contemporaneously to identify potash enclaves under an earlier, nearly identical 1975 Secretarial Order.<sup>10/</sup> Rather, the issue here presented is whether BLM can rely exclusively upon the Van Sickle Standard to identify potash enclaves under the Secretarial Order.

[1] BLM impliedly asserts (but does not demonstrate) that mineral classification standards cannot be reviewed by this Board and then argues that we can neither review the Van Sickle Standard nor BLM’s use of that standard to identify potash enclaves because the Van Sickle Standard was based upon its potash mineral classification standard. (BLM SOR at 2-3.) Even if a mineral classification standard were not subject to our direct review,<sup>11/</sup> we emphasize that we are not here reviewing the potash mineral classification standard but a tool used by BLM to

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<sup>10/</sup> 40 FR 51489 (Nov. 5, 1975). BLM asserts that it has successfully used the Van Sickle Standard for over 20 years to identify potash enclaves under the Secretarial Order and its 1975 predecessor. (BLM SOR at 3.) Even if true, we do not find that this extended use by BLM necessarily precludes our reviewing whether the Van Sickle Standard can be used to identify potash enclaves under the Secretarial Order.

<sup>11/</sup> A mineral classification standard is not the same as a standard promulgated under the Administrative Procedure Act which has the force and effect of law. Chrysler Corp. v. Brown, 441 U.S. 281, 301-02, 315 (1974). The identification of a potash enclave under the Secretarial Order is not the same as a land classification decision which is beyond our review by rule. See e.g., 43 CFR 2450.5, 2461.3, or 2462.3; Oregon Natural Resources Council, 78 IBLA 124, 127 (1983). In any event, we need not and, therefore, do not here express a view as to whether mineral classification standards are otherwise reviewable by this Board.

identify potash enclaves (i.e., the Van Sickle Standard). Accordingly, we find that BLM's use of the Van Sickle Standard is reviewable to ensure that such use is consistent with the requirements of the Secretarial Order, including whether BLM identified and periodically revised potash enclaves based upon its consideration of "existing technology and economics," under and as required by that Secretarial Order. Cf. Yates, 131 IBLA at 235-36.

IMC/Potash raise different arguments to preclude our review, focusing on a Departmental Directive (with instructions) and essentially arguing that this Directive and its implementing Instructions ratified the Van Sickle Standard or otherwise established a Departmental policy to use that standard when identifying and revising potash enclaves. (IMC/Potash SOR at 8-9.) We disagree.

The Directive was issued by Assistant Secretary Gary Carruthers on May 3, 1983; its implementing Instructions were issued by BLM Director Robert Burford (after concurrence by the Assistant Secretary), also on May 3, 1983. (Yates/Pogo Ex. 249.) The Directive states only that:

The Secretarial Order of November 5, 1975 adequately reflects the Secretary's current policy of providing multiple mineral development within the Potash Area while protecting the rights of both oil and gas and potash lessees. To ensure that the Secretary's policy is adequately implemented the following actions are to be taken:

1. The Potash Enclave Map of 1979 will be updated in 1983 to reflect the most current data available. This will ensure that the best possible determinations are made under the Order.

(Yates/Pogo Ex. 249 ("Directive").) Although we are bound by that Directive, see Blue Star, 41 IBLA 333, 335 (1979), it neither ratified the Van Sickle Standard nor established policy on its use. To the contrary, the Directive eschews establishing any policy and states that its requirements are to ensure that the Secretarial Order is "adequately implemented." We, therefore, find that the Directive has no effect on our review.

As to identifying potash enclaves under and as required by the Secretarial Order, the Instructions provide that:

A potash enclave shall be designated as an area where potash ore is known to exist in sufficient thickness and quality to be mineable under present day technology and economics. An area shall not be designated as an enclave if it does not include a single ore body consisting of at

least four (4) feet of ten percent (10%) K<sub>2</sub>O as sylvite or four (4) feet of four percent (4%) K<sub>2</sub>O as langbeinite.

(Yates/Pogo Ex. 249, Instructions at 1.) We read these instructions as directing BLM personnel to identify enclaves containing potash ore that is “mineable under present day technology and economics” but to exclude any area that has less than four feet of sylvite ( $\geq 10\%$ ) or four feet of langbeinite ( $\geq 4\%$ ). We also read them as requiring that potash enclave maps “be updated at 4 year intervals, or sooner,” *id.*, based upon BLM’s consideration of the most current data available, including what is then mineable under present day technology and economics. So considered, we find that these Instructions <sup>12/</sup> neither ratified the Van Sickle Standard nor established Departmental policy on its future use.

The Van Sickle Standard articulates a numerical formula that was used by BLM to establish a bright line for identifying what is mineable under the Secretarial Order: “Potash ore of minimum quality and thickness greater than 4' of 10% K<sub>2</sub>O/Sylvite or 4' of 4% K<sub>2</sub>O/Langbeinite or equivalent combinations of the two.” (INT Ex. 19 (emphasis added).) The Instructions are similar, but they establish a different bright line for identifying what is not mineable under the Secretarial Order. By implication and viewed in the obverse, the Instructions also delimit what may be mineable under present day technology and economics. By deleting reference to an “equivalent combination” of sylvite or langbeinite, the Instructions’ bright line is different and excludes deposits that would be within a potash enclave under the Van Sickle Standard. For example, deposits containing four feet of 5% langbeinite and 2% sylvite are equivalent, <sup>13/</sup> would be included within a potash enclave under the Van Sickle Standard, but are expressly excluded under the Instructions. Not only are the lines based upon different numeric formulae, but the effect of those lines is also different: the Van Sickle formula was used to identify what is mineable; whereas the

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<sup>12/</sup> The Directive’s implementing instructions are clearly binding on BLM personnel unless and until a conflict exists between its requirements and the subsequently issued Secretarial Order. So considered and if BLM determines that a lesser thickness, quality, or combination of potash ore grades is mineable under current technology and economics (e.g., due to advances in potash mining technology or significant improvements in potash mining economics), it must follow the Secretarial Order when identifying a potash enclave and would not then be bound by the Instructions’ formula for excluding such areas from a potash enclave.

<sup>13/</sup> The Van Sickle Standard does not describe what are equivalent deposits, but the potash mineral classification standard does. See INT Ex. 6 at 4-5. Accordingly and of necessity, we here use the mineral classification standard to identify mixed deposits of sylvite and langbeinite that would be equivalent under the Van Sickle Standard.

Instructions's formula identifies what is not mineable. Whatever force and effect the Instructions may have on our review, it is clear that they neither ratified nor established a Departmental policy requiring that the Van Sickle Standard be used to identify potash enclaves under the Secretarial Order. Accordingly and in this context, the Van Sickle Standard and BLM's use of that standard are subject to our review.

The first substantive enclave issue raised by the parties relates to the denial of APDs based on "life-of-mine reserves" (LMRs) identified under state law. The New Mexico Oil Conservation Division (NMOCD) promulgated Order R-111-P to govern the drilling of oil and gas wells in the Potash Area. The NMOCD order expressly allows a potash miner to establish LMRs and then prohibits oil and gas drilling through LMRs (and their buffer zones) without the miner's consent. IMC/Potash contend that Judge McDonald should have affirmed the denial of APDs located in LMRs because the Secretarial Order requires the Department to "cooperate with the New Mexico Oil Conservation Division in the implementation of that agency's rules and regulations." 51 FR at 39426 (Section III, Part E, Item 3).

[2] We concur in Judge McDonald's finding that the New Mexico definition of an LMR differs from a potash enclave in at least two respects: "First, the definition of potash enclaves includes the word 'economics,' a term not mentioned in the definition of an LMR. Second, LMR's are established based upon the 'reasonable belief' of a potash lessee, while an enclave consists of potash ore which is 'known to exist.'" (ALJ Decision at 40-41.) Accordingly, we hold that BLM cannot abrogate its duties under the Secretarial Order to consider existing economics and resources known to exist by relying exclusively upon NMOCD maps and their depiction of LMRs to identify potash enclaves. <sup>14/</sup>

[3] IMC/Potash and BLM contend that the record supports the continued use of the Van Sickle Standard for identifying enclaves because it has been consistently utilized by BLM to identify potash enclaves since 1974. (IMC/Potash SOR at 9; BLM SOR at 2.) The Secretarial Order requires BLM to review potash enclaves periodically

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<sup>14/</sup> This is not to suggest that LMRs are irrelevant to BLM's identification of a potash enclave. Cf. 56 FR 5697 (Feb. 12, 1991) (LMRs would have replaced potash enclaves in this proposed, but never issued, secretarial order). Such information could be "quite helpful" and "undoubtedly useful" in making informed decisions under the Secretarial Order, ALJ Decision at 38, 40, as could the Van Sickle Standard (e.g., to aid in establishing the outer boundaries of a possible enclave). In recognizing the utility of this information to BLM's decisionmaking, however, we emphasize that BLM must use the best data available and separately determine whether all or any part of these areas are "mineable under existing technology and economics" when identifying and periodically revising potash enclaves under the Secretarial Order.

based upon the best data currently available and in consideration of existing technology and economics. The record presented does not demonstrate that BLM conducted any review of current technology and economics or periodically evaluated whether the Van Sickle Standard remained effective and appropriate for identifying potash enclaves, under and as required by the Secretarial Order. Accordingly, we hold that BLM failed to identify potash enclaves properly and in the manner prescribed by the Secretarial Order.

BLM also claims that Judge McDonald should have found that recent potash mining at ore grades identified in the Van Sickle Standard demonstrated that it is still valid for use under the Secretarial Order, asserting that she may not have understood the complex process used to supply a steady stream of marketable ore to the potash milling process. (BLM SOR at 6.) IMC/Potash claim error in Judge McDonald's failure to accept IMC testimony that its economic cut-off grades for potash mining were essentially the same as the Van Sickle Standard, thereby confirming its continuing validity under the Secretarial Order. (IMC/Potash SOR at 9-13.)

IMC presented testimony and exhibits to demonstrate that its actual mining practices confirmed that the Van Sickle Standard is still valid, but Judge McDonald found that IMC "has mined exceedingly small quantities of ore at or below BLM's cutoff grades" and "that IMC has produced most of its ore at grades considerably above them." (ALJ Decision at 189.) After thoroughly considering the data presented and the testimony of multiple experts, Judge McDonald determined that "a review of the reports reveals little indication that ore was mined at grades approximating BLM's standards" and that "there is little indication that any appreciable amount of ore has been mined at or near BLM's numerical standards of 10% K<sub>2</sub>O as sylvite and 4% K<sub>2</sub>O as langbeinite." *Id.* at 191, 192. <sup>15/</sup> She therefore concluded that recent mining did not establish that the Van Sickle Standard continued to be valid for use in identifying and revising potash enclaves under the Secretarial Order. *Id.* at 192.

[4] IMC/Potash and BLM argue that Judge McDonald should have weighed the evidence differently and given greater weight to IMC's evidence, but they offer nothing to demonstrate that she misunderstood the points at issue. See Edward C. Faulkner, 164 IBLA 204, 210 (2004) (an appellant must affirmatively show the error in the decision from which it appeals); Larry Thompson, 151 IBLA 208, 217 (1999)

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<sup>15/</sup> Judge McDonald also noted that cash flow projections for the Waste Isolation Pilot Plant "fail to show that langbeinite and sylvite are economically mineable at grades of 4 and 10%." (ALJ Decision at 192.) This plant is a permanent repository for the storage of transuranic waste. It is located in the Potash Area on lands withdrawn from operation of the mining laws. See 57 FR 55277 (Nov. 24, 1992).

(an appellant must demonstrate either an error of law or fact and that burden must be satisfied by objective evidence). We find that Judge McDonald's thorough review of this voluminous record demonstrated a keen understanding of the complex factual issues presented. Neither BLM nor IMC/Potash have demonstrated clear error in Judge McDonald's evaluation of the evidence (only a disagreement on its import). Under such circumstances this Board will not substitute its weighing of that evidence for hers.

IMC/Potash also contend that Judge McDonald erred in observing that "[t]he most important evidence of the grades of potash which are 'mineable under existing technology and economics' is that which the mines in the Potash Area have in fact been mining in recent years." (IMC/Potash SOR at 14, quoting ALJ Decision at 188.) Since potash mining is not a charitable undertaking, it logically follows that potash ore grades currently being mined are "mineable under existing technology and economics."<sup>16/</sup> It does not, however, necessarily follow that recent mining also establishes applicable economic cut-off grades (i.e., grades below which it is no longer economic to mine potash) or identifies the outer limits of a potash enclave (i.e., minimum grades of potash ore that are mineable under existing technology and economics).<sup>17/</sup> So considered, we find no error in Judge McDonald's above-quoted observation.

In summary, we (1) hold that this Board has the authority to review BLM's use of the Van Sickle Standard to identify enclaves under the Secretarial Order, (2) determine that the 1974 Van Sickle Standard was not shown to satisfy the requirements of the Secretarial Order, and (3) find that BLM failed to consider existing technology and economics based upon the best data currently available in periodically identifying and revising potash enclaves under and as required by the Secretarial Order. Accordingly, we affirm Judge McDonald's finding that APD denials based upon the enclave policy must be remanded for BLM's proper identification of potash enclaves and subsequent application of the enclave policy to the APDs at issue.

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<sup>16/</sup> For example, if 10% sylvite were mined (i.e., the same potash ore grade identified in the Van Sickle Standard), such could confirm the continuing validity of the Van Sickle Standard for identifying potash ore that is of sufficient thickness and quality to be mineable under existing technology and economics.

<sup>17/</sup> For example, if 15% sylvite were mined, such could support a finding that  $\geq 15\%$  sylvite is mineable but shed little light on whether 10% is also mineable (but yet to be mined). Such mining would neither confirm nor rebut the continuing validity of the Van Sickle Standard (i.e., 4 feet of 10% sylvite) for identifying potash enclaves under the Secretarial Order.

*Royalty Rate Reductions and the Identification of Potash Enclaves:*

Royalty rate reductions for expanded potash recovery were granted by BLM to all lessees in 1994. (ALJ Decision at 21-33.) The parties generally agree that these reductions were granted to maximize potash recovery and to provide an incentive for recovering potash that would not otherwise be economically recoverable in the Potash Area. Lessees applying for royalty reductions based on expanded recovery must not only “indicate the extent and location of additional resources that would be mined as a result of the reduced royalty rate,” but also certify that such resources are “economically unrecoverable at the lease royalty rate using current standard industry operating practices.” (Pogo/Yates Ex. 694, 1987 Royalty Guidelines at 9, 19.) If BLM determines that these additional resources identified by the lessee-applicant are “economically unrecoverable without a royalty reduction based on adverse geologic and engineering conditions using current standard industry practices,” the State Director may approve the application and reduce the applicable royalty rate. Id. at 19.

Royalty reductions for potash lessees have existed in the Potash Area since at least the early 1980s. (Yates/Pogo Ex. 456, Royalty Report at 2.) A sliding scale royalty rate reduction (2-5% based on potash ore grades) was replaced in 1986 by a basin-wide, reduced royalty rate of 2% for all potash ore grades. Id. In late 1993, each potash lessee applied for continued royalty rate reductions under BLM’s 1987 Royalty Rate Reduction Guidelines. See Yates/Pogo Exs. 450-455. BLM evaluated each application and determined that over 40 million tons of potash ore would not be mined if the potash royalty rate returned to 5%. <sup>18/</sup> (Yates/Pogo Ex. 456, Royalty Report at 3-11.) An accompanying BLM report represented that “[a]t 2% royalty the [potash] industry is in economic trouble; therefore, any increase would be disastrous.” (Yates/Pogo Ex. 456, Potash Market Status Report at 3.) Each royalty reduction application was approved by the State Director.

Yates/Pogo contend that by broadly granting royalty reductions to all potash lessees without regard to potash ore grades being mined, BLM necessarily determined that no potash was economically recoverable in the Potash Area. Yates/Pogo further argue that if no potash is “economically recoverable” under applicable royalty guidelines, perforce it is not mineable under existing economics under the Secretarial Order. (Pogo SOR at 8-11 and 19-21.) IMC/Potash counter that industry-wide royalty reductions are irrelevant to the identification of potash enclaves because the criteria governing royalty reductions involve different considerations and serve

<sup>18/</sup> Absent from the lessees’ applications and BLM’s subsequent determinations are any details on specific resources and potash ore grades that became economically recoverable as a result of these royalty reductions. See Yates/Pogo Exs. 450-456.

purposes different from those that apply to identifying potash enclaves under the Secretarial Order. (IMC/Potash SOR at 16-17.) BLM similarly counters that non-economic factors can justify royalty rate reductions. (BLM SOR at 9-12.)

Judge McDonald rejected Yates/Pogo's claim that no potash was economically recoverable or mineable under existing economics simply because BLM broadly granted royalty relief to all potash lessees. (ALJ Decision at 183.) It is certainly possible that no potash mining would occur in the Potash Area without royalty reductions due to the difficult economic circumstances facing the domestic potash industry. See id. at 180; Yates/Pogo Ex. 456. The several royalty rate reduction applications and associated BLM reports, however, indicate that at least some potash mining would continue even if these applications were denied and the royalty rate returned to 5%. <sup>19/</sup> We must, therefore, reject Yates/Pogo's overly broad assertion that no potash in the Potash Area is economically recoverable (without royalty rate reductions) or that BLM necessarily determined that no potash is economically recoverable in the Potash Area by broadly granting royalty relief to all potash lessees for all grades of potash ore.

Even if BLM had determined that no potash in the Potash Area was economically recoverable without royalty reductions, such would not compel a separate finding that no potash is mineable under existing economics. Issues addressed in granting royalty reductions are similar to (but not the same as) those that are considered when identifying potash enclaves under the Secretarial Order (e.g., whether certain potash is economically recoverable in the absence of royalty reductions vs. what grades of potash ore are mineable under existing economics). Accordingly, we hold that BLM determinations of what potash ore is "economically recoverable" under its royalty rate reduction guidelines would not necessarily also determine, as a matter of law, what potash is "mineable under existing technology and economics" under the Secretarial Order.

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<sup>19/</sup> Although significant potash reserves would be "lost" if the royalty rate reduction applications were denied, considerable reserves would still be mined in the Potash Area. Even without royalty relief, Western AG Minerals Company was estimated to have 25+ years of mineable potash reserves, Mississippi Chemical Corporation was estimated to have nearly 100 years of mineable potash reserves (low-grade ore would be bypassed due to its mining method), and New Mexico Potash Corporation was estimated to have 12 million tons of mineable reserves. (Yates/Pogo Ex. 456, Royalty Report at 2, 4, 7, 8, 9.) IMC estimated that it would have roughly 90 million tons of mineable potash reserves even without royalty relief: identified potash reserves of 176 million tons less 80 million tons that would be reclassified as unrecoverable if royalty reduction relief was then denied. (Yates/Pogo Ex. 451 at 9, 12.)

[5] It is generally agreed by the parties that reduced royalty rates for all potash lessees caused at least some uneconomic potash ore grades to become economically recoverable. BLM tacitly concedes that it did not consider the effect of royalties or royalty reductions on the mineability of potash ore grades when identifying potash enclaves. (BLM SOR at 11.) On remand, BLM will be required to identify potash enclaves properly under the Secretarial Order and to consider anew whether to grant these APDs. We need not and therefore do not express a view as to whether the Secretarial Order's reference to "existing economics" necessarily includes or implicitly excludes consideration of royalties and royalty reductions when identifying or revising potash enclaves.<sup>20/</sup> It may be that applicable potash lease royalty rates should be considered when identifying a potash enclave but that royalty relief can be excluded from BLM's calculus because the Order's reference to existing economics may suggest a particular policy direction (e.g., to exclude the effect of discretionary BLM actions that would expand the potash enclaves).<sup>21/</sup> In any event, it is for BLM to determine and implement that policy direction in the first instance (e.g., whether and, if so, how best to consider royalties and royalty rate reductions in its enclave decisionmaking). BLM's decision rationale should be articulated and supported in an appropriate record. See Pacific Offshore Operators, Inc., 165 IBLA 62, 76-77 (2005).

A related issue addressed at the hearing was the identification of potash ore grades that became economically recoverable as a result of royalty relief.<sup>22/</sup> Judge McDonald attempted to determine what these economic cut-off grades were but concluded that there was simply not enough evidence upon which to make that determination. Although some companies had mined some potash at ore grades as

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<sup>20/</sup> If royalty rate reductions are considered, potash reserves that became economically recoverable as a consequence of these reductions could also be mineable under existing economics (potentially increasing the size of a potash enclave); but if such reductions are not considered in identifying potash enclaves, BLM must necessarily determine what potash ore grades would be mined without these royalty rate reductions (potentially decreasing the size of a potash enclave).

<sup>21/</sup> Judge McDonald observed that potash ore that is not economically recoverable without royalty reductions may not be mineable under existing economics. (ALJ Decision at 185.) Cf. BLM SOR at 2. We express no view on whether her dicta is consistent with the purposes, objectives, and express requirements of the Secretarial Order or whether it should be followed by BLM on remand.

<sup>22/</sup> IMC/Potash and BLM assert that Judge McDonald was required to identify economic cut-off grades (IMC/Potash SOR at 17 and BLM SOR at 11). We disagree and find that it is BLM that should have identified cut-off grades at the time it granted broad relief to all potash lessees under its royalty guidelines.

low as those reflected in the Van Sickle Standard, she reasoned that this was not dispositive on what potash ore became “economically recoverable” under BLM’s royalty reduction guidelines or is “mineable under existing technology and economics.” (ALJ Decision at 192.) Judge McDonald thoroughly evaluated the evidence presented and determined that it was insufficient to establish economic cut-off grades. *Id.* at 185. We find no error in her analysis and, therefore, reject the claims made by IMC/Potash and BLM.

Identifying cut-off grades that are of “sufficient thickness and quality to be mineable under existing technology and economics,” 51 FR at 39425 (Section III, Part D, Item 1.c), is dependent on BLM’s first determining whether and, if so, how best to consider lease royalty rates and royalty reductions in its enclave decisionmaking. If it determines that royalty reductions should be so considered (e.g., a 2% reduced royalty rate), cut-off grades under the Secretarial Order would likely include all potash ore that became economically recoverable as a result of BLM’s broad grant of royalty relief; but if lease royalties without royalty relief are so considered (e.g., a 5% lease royalty rate), such cut off grades would likely be higher and exclude potash ore grades that became economically recoverable. As previously mentioned, it is for BLM to make these determinations and to identify potash enclaves under, as required by, and consistent with the Secretarial Order.

We hold that Judge McDonald properly rejected Yates/Pogo’s overly broad assertion that no potash is “economically recoverable” or “mineable under existing technology and economics” solely because BLM granted royalty rate reductions to all potash lessees for all grades of potash mined in the Potash Area. We also note that BLM should identify potash ore grades that are not economically recoverable at the lease royalty rate (without a royalty rate reduction) and use that information to make informed decisions on whether and, if so, how best to consider royalties and royalty reductions when identifying and revising potash enclaves under the Secretarial Order.

*Excluded Testimony:*

Pogo contends that Judge McDonald erred in refusing to allow Phillip Wm. Lear, an attorney in the employ of Yates/Pogo, to testify as an expert witness on the legislative, regulatory, and administrative history of multiple use and concurrent development of mineral resources on Federal lands. Judge McDonald’s initial refusal to allow Lear to testify was the subject of an interlocutory appeal, but this Board declined to review this purely evidentiary determination and noted that:

We believe that the correct procedure requires any party objecting to either the admission or exclusion of evidence at a hearing

to place that objection on the record at the proper time and, if the ruling is to exclude evidence, to make an offer of proof sufficient to clarify the substance of the excluded evidence so that the presiding judge and, should an appeal subsequently arise, the Board can readily discern both the relevance and materiality of the proffered material. The hearing, however, must proceed uninterrupted by attempts to obtain immediate review of the challenged ruling.

Yates Petroleum Corp., 136 IBLA 249, 252 (1996). When the hearing resumed, Yates/Pogo again sought to introduce Lear's testimony. BLM and IMC/Potash objected to his testimony as being neither relevant nor material. Judge McDonald excluded this testimony. Pogo challenges her exclusion of Lear's testimony at length. (Pogo SOR at 25-85.)

[6] The hearing procedures delineated in 43 CFR Part 4, Subpart E, provide that an "administrative law judge is vested with general authority to conduct [a] hearing in an orderly and judicial manner, \* \* \* and to take such other actions in connection with the hearing as may be prescribed by the Board in referring the case for hearing." 43 CFR 4.433. Not only did Judge McDonald have the general authority to restrict or exclude Lear's testimony, see 43 CFR 4.435(a), but applicable hearing procedures also expressly addressed the current circumstance:

Objections to evidence will be ruled upon by the administrative law judge. Such rulings will be considered, but need not be separately ruled upon, by the Board in connection with its decision. Where a ruling of an administrative law judge sustains an objection to the admission of evidence, the party affected may insert in the record, as a tender of proof, a summary written statement of the substance of the excluded evidence and the objecting party may then make an offer of proof in rebuttal.

43 CFR 4.435(b) (emphasis added). Consistent with this procedure, Yates/Pogo submitted a 365-page affidavit of Lear's anticipated testimony. (ALJ Decision at 4 n.1.) Pogo separately submitted a 44-page precis of that testimony. (Pogo SOR at 43-86.) A review of these proffers and Judge McDonald's Order demonstrates that no new facts would have been presented through Lear's testimony and that the matters on which he would have testified were raised by others and thoroughly considered by Judge McDonald. Accordingly, Pogo has not demonstrated that it was prejudiced by the exclusion of Lear's testimony and we find no error in Judge McDonald resolving this matter without the benefit of his testimony.

*Test Wells under the Enclave Policy:*

The Secretarial Order's enclave policy applies to "oil and gas test wells," 51 FR at 39425 (Section III, Part E, Item 1); the 1975 Secretarial Order was the same except that it applied to "oil and gas tests," 40 FR at 51490. Pogo argues that the enclave policy does not apply to oil or gas development and production because references to "tests" or "test wells" means exploration or exploratory wells only. (Pogo SOR at 95-101.)

Pogo's claims on appeal are based largely upon its characterization of how the Secretarial Order could be interpreted so as to achieve the result it seeks (*i.e.*, the enclave policy applies only to exploratory wells). It neither argues nor persuasively demonstrates that the enclave policy, by its terms or based on its history, must be limited to exploratory wells only. Although we agree with Pogo that reference to "tests" or "test wells" should have some meaning, we disagree on whether these terms mean or can only refer to exploration or exploratory wells under the Secretarial Orders.

Judge McDonald properly recognized that the meaning of "tests" or "test wells" is not determined by what the oil and gas or potash industries understand them to mean, but by the meaning intended and expressed in the Secretary's 1975 and 1986 Secretarial Orders. (ALJ Decision at 88-89.) She thoroughly reviewed the pre-1975 history and origin of the enclave policy, including each of the documents relied upon by Pogo, and concluded that tests/test wells "must be construed to refer to both exploratory and development wells." (ALJ Decision at 94 (*emphasis added*).)

We have reviewed the same history considered by Judge McDonald. Key documents in our consideration of that history are:

(1) September 6, 1973, Memorandum from the Conservation Manager, Central Region, USGS, to the Chief, Conservation Division, USGS. (Yates/Pogo Ex. 237.) It addressed "the approval or disapproval of any given oil or gas test well in the oil-potash area" and made recommendations to affect "any oil or gas well test (exploratory or otherwise) within the Known Potash Area," *id.* at 2, including specific recommendations for "exploratory wells" (directional drilling to avoid commercial potash), "development" (under an approved plan of operations), and "development wells" (directional drilling from islands). *Id.* at 3.

(2) December 7, 1973, Memorandum from the Chief, Conservation Division, USGS, to the Director, USGS. (Yates/Pogo Ex. 238.) In

forwarding the September 6, 1973, Memorandum, it identified the problem addressed as “which proposed oil and gas tests may be drilled.” Id. It recommended a procedure for identifying “potash enclaves” and a “Departmental policy to deny oil and gas drilling operations within the ‘potash enclaves.’” Id. at 2, 3.

(3) February 14, 1974, Revised Memorandum from the Chief, Conservation Division to the Director, USGS. (Yates/Pogo Ex. 239.) In again forwarding the Conservation Manager’s September 6, 1973, Memorandum, it recommended a procedure for identifying potash enclaves and adoption of an enclave policy. Id. at 2-3. Without explanation, however, it substituted “oil and gas tests” for “oil and gas drilling operations” in the proposed enclave policy and added a drilling island exception to that policy. Id. at 3-4. Both recommendations were approved by the Secretary of Interior (Yates/Pogo Ex. 240), and later reflected in the Secretarial Order. (Yates/Pogo Ex. 241.)

We also note that BLM personnel responsible for implementing the Secretarial Order apparently applied the enclave policy equally to exploratory, development, and production wells since 1975. See generally ALJ Decision at 94-97. So considered, we find that neither the Secretarial Order’s reference to “oil and gas test wells” nor the 1975 Secretarial Order’s reference to “oil and gas tests” is clearly limited to exploration or exploratory drilling only and that these terms most likely refer to all oil or gas wells (e.g., all oil and gas test wells, exploratory or otherwise).

Pogo’s claims here are essentially the same as those it advanced before Judge McDonald. Pogo has done little more on appeal than express its disagreement with her rationale and conclusion. It advances no new arguments that evince how Judge McDonald’s decision is in error. See Shell Offshore, Inc., 116 IBLA 246, 250 (1990) (the obligation to show error is not satisfied if the appellant has merely reiterated the arguments already considered by the decisionmaker below). We have nonetheless independently evaluated the evidence presented and conclude that we must reject Pogo’s overly narrow construction of “tests” and “test wells” as applying only to exploration and exploratory wells under the Secretarial Orders.

*Drilling Island Exception to the Enclave Policy:*

The enclave policy recognizes limited exceptions for the drilling of oil and gas wells within a potash enclave for “barren areas” <sup>23/</sup> and “drilling islands.” 51 FR at 39425-26 (Section III, Part E, Item 1). As to drilling islands, the Secretarial Order specifies that they must be established when:

- (1) There are no barren areas within the enclave or drilling is not permitted on the established barren area(s) within the enclave because of interference with mining operations;
- (2) the objective oil and gas formation beneath the lease cannot be reached by a well which is vertically or directionally drilled from a permitted location within the barren area(s); [and]
- (3) in the opinion of the authorized officer, the target formation beneath a remote interior lease cannot be reached by a well directionally drilled from a surface location outside the potash enclave.

51 FR at 39425 (Section III, Part E, Item 1.b). If all three conditions exist, BLM will establish a drilling island even if one is not requested by an APD. Cf. Yates/Pogo Ex. 249, Instructions at 2. The precise location, size, and contours of a drilling island are to be determined by BLM under the Secretarial Order:

The authorized officer, in establishing any such [drilling] island, will, consistent with present directional drilling capabilities, select a site which shall minimize the loss of potash ore. No island shall be established within one mile of any area where approved mining operations will be conducted within three years.

51 FR at 39426 (Section III, Part E, Item 1.b). Judge McDonald briefly discussed drilling islands when reviewing the State Director’s August 21, 28, and November 6, 1992 APD denials. (ALJ Decision at 238-40.) Yates takes issue with that discussion.

Yates first asserts that Judge McDonald erroneously found that the Secretarial Order precludes the drilling of vertical wells within a drilling island (Yates SOR at 9-11), but we find no support for this characterization of her decision. We have

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<sup>23/</sup> “Drilling of vertical or directional holes shall be allowed from barren areas within the potash enclaves when the authorized officer determines that such operations will not adversely affect active or planned mining operations in the immediate vicinity of the proposed drillsite.” 51 FR at 29425-26 (Section III, Part E, Item 1.a).

reviewed her opinion and are unable to identify any holding or other statement that could preclude the drilling of vertical wells from a drilling island. The absence of such a holding or statement is fully understandable because the Secretarial Order expressly provides that “[d]rilling of vertical or directional holes shall be permitted from a drilling island.” We find no basis for Yates’ claimed error.

Yates also claims error in Judge McDonald’s failure to require BLM to establish drilling islands from which it could engage in economically feasible directional drilling.<sup>24/</sup> (Yates SOR at 11-15.) In order to establish a drilling island under the Secretarial Order, BLM must first determine that the target formation “cannot be reached by a well \* \* \* directionally drilled” from either a barren area or an area outside the enclave. 51 FR at 39426 (Section III, Part E, Item 1.b). If that target cannot be reached by directional drilling, BLM must select a drilling island site that minimizes the loss of potash ore “consistent with present directional drilling capabilities.” Id. A fair reading of the Secretarial Order, consistent with its express intent to minimize the loss of potash ore, suggests that technical capability (not economic feasibility) of directional drilling is the touchstone for drilling island determinations. See also Yates/Pogo Ex. 249, Instructions at 3 (“The maximum horizontal displacement from a drilling island has been established as 3/4 of a mile based on current technology”). Moreover, we find nothing in the history of the Secretarial Order suggesting that BLM must consider economic feasibility when making determinations concerning directional drilling.

[7] We therefore conclude that BLM can satisfy its obligation to establish and locate a drilling island under the Secretarial Order by considering whether reasonably available directional drilling technologies and techniques can reach the APD’s intended target from a barren area, an area outside the enclave, or an appropriately limited drilling island.<sup>25/</sup> Since BLM is not then also required to consider drilling

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<sup>24/</sup> Since a company may well prefer to drill less expensive vertical wells from multiple drilling islands rather than multiple, more expensive directionally drilled wells from a single island, it is likely that this preference would then be reflected in a company’s internal calculus on what it considers to be economically feasible.

<sup>25/</sup> With unlimited funds and in recognition of the innovation and creativity of the oil and gas drilling industry, virtually any target can be reached from any location, near or distant from a potash enclave. So considered, “reasonably available” technologies or techniques include demonstrated technologies and techniques that have been utilized under similar circumstances or could be used in the Potash Area, considering target depth, the depth of mineable potash ore, and the horizontal displacement of the target from the surface drilling location but would exclude untried, unproven, or  
(continued...)

economics or whether a particular well is economically feasible, we reject Yates' claim of error.

*Oil and Gas Lease Stipulations:*

The Secretarial Order (and all similar Secretarial Orders since 1951) requires each oil and gas lease in the Potash Area to include four stipulations:

1. Drilling for oil and gas shall be permitted only in the event that the lessee establishes to the satisfaction of the authorized officer, Bureau of Land Management, that such drilling will not interfere with the mining and recovery of potash deposits, or the interest of the United States will best be served by permitting such drilling.
2. No wells shall be drilled for oil or gas at a location which, in the opinion of the authorized officer, would result in undue waste of potash deposits or constitute a hazard to or unduly interfere with mining operations being conducted for the extraction of potash deposits.
3. When the authorized officer determines that unitization is necessary for orderly oil and gas development and proper protection of potash deposits, no well shall be drilled for oil or gas except pursuant to a unit plan approved by the authorized officer.
4. The drilling or the abandonment of any well on said lease shall be done in accordance with applicable oil and gas operating regulations (43 CFR 3169), including such requirements as the authorized officer may prescribe as necessary to prevent the infiltration of oil, gas or water into formations containing potash deposits or into mines or works being utilized in the extraction of such deposits.

51 FR at 39425 (Section III, Part A, Items 1-4). Judge McDonald reviewed these stipulations and evaluated their effects in detail. (ALJ Decision at 52-65 and

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<sup>25/</sup> (...continued)

experimental drilling technologies and techniques. The mere fact that a directional drilling technology or technique may be more costly in the Potash Area would not alone be a sufficient basis on which to exclude a technology or technique from consideration by BLM when establishing or locating a drilling island under the Secretarial Order.

194-97.) She rejected IMC/Potash's claim that possible contamination of potash from oil and gas operations is a sufficient basis on which to deny an APD. Referring to the first and second stipulations, she noted that they "are more appropriately understood to address the question whether drilling a well at the location identified in an APD will physically limit or preclude mining a potash deposit." Id. at 196. IMC/Potash contend that this means that only the "physical presence of an oil and gas well" can be considered by BLM and then argue that such a narrow reading of these stipulations is contrary to the Secretarial Order. (IMC/Potash SOR at 20-21.) We disagree.

As reflected in Judge McDonald's discussion of specific APDs that were denied under these oil and gas lease stipulations, her focus was clearly on whether contamination from oil and gas operations would occur and adversely affect potash and potash mining:

[The second oil and gas lease stipulation] requires a determination that a well would present a hazard to mining operations, not simply the "potential" to make mining potash unsafe. Indeed, if [IMC/Potash Association] are correct, all oil and gas wells within the Potash Area have the potential to allow fluids, methane in particular, to enter and migrate through the McNutt portion of the Saldo Formation. Finding a "potential" to make mining unsafe to be a sufficient basis to deny approval of an APD would have the effect of prohibiting oil and gas drilling within most or all of the Potash Area, possibly allowing wells to be drilled on its periphery or in large barren areas.

(ALJ Decision at 236.)

The State Director's decisions are unclear as to which provision [oil and gas lease stipulation 1 or 2] was being applied, but neither is satisfied by a determination that drilling would "likely" interfere with potash mining. Nor is a finding that drilling is "likely" to result in undue waste sufficient under the second stipulation. Similarly, the statement that drilling "could \* \* \* prove hazardous" fails to address the standard of the second stipulations which requires a finding that a well would "constitute a hazard" to mining operations.

Id. at 245; see also id. at 242-43, 246. Judge McDonald's holdings were based on whether oil and gas wells "would" cause waste, hazards, or interference with potash and potash mining; none of her holdings were based on the mere physical presence of an oil or gas well. Since these holdings are grounded on the express terms of the first and second oil and gas lease stipulations, we find no error in her analysis and

reject IMC/Potash's suggestion that they should be interpreted as precluding oil and gas activities that "could" result in potash waste or adversely affect potash mining.

As added support for the reasonableness of her consideration of this issue, we note that the fourth oil and gas stipulation should prevent potash waste and the adverse effects to potash mining that IMC/Potash fear could result from oil and gas drilling in the Potash Area. It expressly requires that oil and gas drilling be in compliance with all applicable regulations and other requirements "necessary to prevent the infiltration of oil, gas or water into formations containing potash deposits or into mines or works being utilized in the extraction of such deposits." 51 FR at 39425 (Section III, Part A, Item 4). Only if this stipulation is ineffective or if unique, unforeseen circumstances are encountered while drilling could any such contamination occur.

[8] Collectively considering the first, second, and fourth oil and gas lease stipulations, we conclude that APDs may be denied if BLM determines that contamination will occur (*i.e.*, infiltration caused by oil and gas drilling cannot be prevented) and then determines that the physical presence of this contamination <sup>26/</sup> will interfere with potash mining, result in undue potash waste, or constitute a hazard to potash mining. So considered, Judge McDonald correctly observed that the oil and gas lease stipulations focus on whether "an APD will physically limit or preclude mining a potash deposit." We reject IMC/Potash Association's strained interpretation on the import of Judge McDonald's observation.

*Potash Lease Stipulation:*

The Secretarial Order (and all similar Secretarial Orders since 1951) also includes a potash lease stipulation specifying that

no [potash] mining or exploration operations shall be conducted that in the opinion of the authorized officer will constitute a hazard to oil or gas production or that will unreasonably interfere with orderly development and production under any oil or gas lease issued for the same lands.

51 FR at 39425 (Section III, Part C). Pogo claimed that this stipulation creates a right to orderly oil and gas development without regard to whether its development is

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<sup>26/</sup> Judge McDonald similarly recognized that "mineable potash which has been rendered unmineable because it has been adulterated by oil, gas or water as the result of oil and gas drilling has been wasted [under the first and second oil and gas lease stipulations]." (ALJ Decision at 195.)

on lands also leased for potash; Judge McDonald rejected that claim.<sup>27/</sup> (ALJ Decision at 58-59.) Pogo has narrowed its claim on appeal to only those APDs that are located on lands also leased for potash and urged this Board to construe and apply the potash lease stipulation to those APDs. (Pogo SOR at 22-23.) Since most APDs at issue were on lands also leased for potash, we will address the merits of Pogo's claimed right to pursue orderly oil and gas development under and as a consequence of those potash leases.

Pogo contends that its right to orderly development under the potash lease stipulation means that its APDs for developmental or production wells cannot be denied under the enclave policy (Pogo SOR at 106-107, 118) and that potash mining and exploration cannot be allowed on lands where there is on-going oil and gas development (i.e., the first in time to develop a resource has an absolute right over the subsequent development of other resources). Id. at 113-14, 118-20, 121-22. Both aspects of its claimed right will be discussed separately below.

Pogo maintains that BLM "nullified" its rights under the potash lease stipulation by applying the enclave policy to its developmental wells. (Pogo SOR at 107.) Pogo asserts that the enclave policy conflicts with the potash lease stipulation and argues that this stipulation must override that policy. We disagree.

The potash lease stipulation does not prohibit all potash mining and exploration that could interfere with oil and gas development. Rather, it prohibits only those potash activities that "will unreasonably interfere with orderly development and production." 51 FR at 39425 (Section III, Part C). Since possible, likely, or potential interference with potash mining is an insufficient basis upon which to deny an APD under the oil and gas lease stipulations, supra at 51-52, possible, likely, or potential interference with orderly oil and gas development is a similarly insufficient basis upon which to prohibit mining or exploration under the potash lease stipulation. BLM must determine not only that potash activities will interfere with oil and gas development (or will constitute a hazard to oil and gas drilling), but also that this interference will be "unreasonable." Since BLM's determinations under this stipulation are inherently fact, issue, and case-specific, we find no clearly unresolvable conflict between the potash lease stipulation and the enclave policy. Accordingly, we reject Pogo's argument and reiterate our earlier

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<sup>27/</sup> The potash lease stipulation applies only to lands leased for potash and affects only potash mining and exploration that is occurring on lands also leased for oil and gas. So considered, Judge McDonald properly rejected Pogo's claim that it had a superior right to develop oil and gas resources under the potash lease stipulation without regard to whether its lands were also leased for potash.

holding that the enclave policy applies to all oil and gas wells in the Potash Area, including developmental and production wells.

Pogo separately argues that the potash lease stipulation creates an absolute preference for orderly oil and gas development over all subsequent potash mining or exploration and that the oil and gas lease stipulations create a similar preference for potash mining over all subsequent oil and gas activities:

If the lease stipulations were properly applied, simultaneous operations would not occur because the first in time to develop would be allowed to continue to develop the leasehold without unreasonable or undue interference from the other.

(Pogo SOR at 113.) The potash lease stipulation protects oil and gas development from potash activities that “will unreasonably interfere” with its operations; the oil and gas lease stipulations similarly protect potash mining from oil and gas activities that “would unduly interfere” with its operations.

The terms used in the potash, oil, and gas lease stipulations evince qualified (not absolute) rights that are predicated upon findings of “undue interference with orderly development and production” or “unduly interfere with mining operations.” These BLM findings are inherently fact, issue, and case-specific, suggesting that there is no clearly unresolvable conflict between oil and gas drilling and potash mining or exploration in the Potash Area. Interpreting the potash lease stipulation as granting unrestricted rights to oil and gas development over potash mining (as asserted by Yates) would also eviscerate the enclave policy and render it meaningless. Accordingly and because concurrent development in the same area is possible and was envisioned under the Secretarial Order, we reject Pogo’s claimed first-in-time, superior right to develop oil and gas resources under the potash lease stipulation.

In affirming Judge McDonald’s Order, we have not addressed each and every claim or argument advanced by the parties in their several appeals of a lengthy, comprehensive decision that was based upon a voluminous record. Accordingly and except to the extent that they are addressed herein, all other errors of fact or law identified by the parties are hereby rejected as contrary to the facts and law or otherwise immaterial to a proper resolution of this matter. See National Labor Relations Board v. Sharples Chemicals, 209 F.2d 645, 652 (6th Cir. 1954); Glacier-Two Medicine Alliance, 88 IBLA 133, 156 (1985).

We recognize that over 10 years have passed since the APDs at issue were first submitted (this is the third time the Board has reviewed this matter) and that a further delay is unavoidable (e.g., BLM must review and revise its previously identified potash enclaves in light of this opinion and consistent with its responsibilities under the Secretarial Order). In light of BLM's earlier representations that it agreed generally with Judge McDonald's Decision and was "continuing its ongoing work to update the potash enclave under the 1986 Order" (BLM SOR at 1), however, we are confident that this delay will not be of extended duration.

Therefore, pursuant to the authority delegated to the Board of Land Appeals by the Secretary of the Interior, 43 CFR 4.1, Judge McDonald's July 7, 2003, Order is affirmed.

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James K. Jackson  
Administrative Judge

I concur:

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H. Barry Holt  
Chief Administrative Judge